

ABSTRACT OF THE DISCLOSURE

A multi-directional diffusion-symmetric slant reflector. A substrate having a plurality of domains thereon is provided. A plurality of diffusion-symmetric slant reflectors are formed on the substrate. The diffusion-symmetric slant reflectors has a variety of shapes, including conical, elliptical cone longitudinal prismatic or other polyhedron shapes. A plurality of bumps, such as cone, elliptical cone or longitudinal prism structures, are formed on the slant surface of the diffusion-symmetric slant reflectors. The longitudinal prismatic and elliptical cone diffusion-symmetric slant reflectors within a domain are aligned to a direction. An reflection layer such as an aluminum layer, a silver layer or a layer made of materials with a characteristic of reflection, is formed over the surface of the diffusion-symmetric slant reflector. A method of forming a diffusion-symmetric slant reflector is also provided. A substrate is provided and then a photoresist layer is formed over the substrate. After the substrate and the photoresist layer assembly are baked, a photolithographic process is conducted using a gray-level mask, a multi-step exposure process or a half-tone mask. The exposed photoresist layer is developed, followed by an intermediate baking and a hard baking. In the final step, aluminum is deposited over the photoresist layer.